CLAIMS

1. A method for lysing adipose tissue comprising the steps of:

directing focussed ultrasonic energy at a target volume in a region of a body containing adipose tissue; and

modulating said focussed ultrasonic energy so as to selectively lyse said adipose tissue in said target volume and generally not lyse non-adipose tissue in said target volume.

2. A method for lysing adipose tissue according to claim 1 and wherein said directing focussed ultrasonic energy generally prevents lysis of tissue outside of said target volume.

3. A method for lysing adipose tissue according to claim 1 and also comprising:

ultrasonic imaging of said region at least partially concurrently with directing said focussed ultrasonic energy at said target volume.

4. A method for lysing adipose tissue according to claim 1 and wherein said directing comprises positioning at least one ultrasonic transducer relative to said body in order to direct said focussed ultrasonic energy at said target volume.

5. A method for lysing adipose tissue according to claim 1 and wherein said directing comprises varying the focus of at least one ultrasonic transducer in order to direct said focussed ultrasonic energy at said target volume.

6. A method for lysing adipose tissue according to claim 5 and wherein varying the focus changes the volume of said target volume.

7. A method for lysing adipose tissue according to claim 5 and wherein varying the focus changes the distance of said target volume from said at least one ultrasonic transducer.

8. A method for lysing adipose tissue according to claim 3 and wherein said directing comprises positioning at least one ultrasonic transducer relative to said body in order to direct said focussed ultrasonic energy at said target volume.

9. A method for lysing adipose tissue according to claim 3 and wherein said directing comprises varying the focus of at least one ultrasonic transducer in order to direct said focussed ultrasonic energy at said target volume.

10. A method for lysing adipose tissue according to claim 9 and wherein varying the focus changes the volume of said target volume.

11. A method for lysing adipose tissue according to claim 9 and wherein varying the focus changes the distance of said target volume from said at least one ultrasonic transducer.

12. A method for lysing adipose tissue according to claim 1 and also comprising sensing ultrasonic energy coupling to an external surface of said body adjacent said target volume.

13. A method for lysing adipose tissue according to claim 1 and also comprising sensing of cavitation at said target volume.

14. A method for lysing adipose tissue according to claim 3 and also comprising sensing ultrasonic energy coupling to an external surface of said body adjacent said target volume.

15. A method for lysing adipose tissue according to claim 3 and also comprising sensing of cavitation at said target volume.

16. A method according to claim 1 and wherein said directing takes place from an ultrasonic transducer located outside of the body.

17. A method according to claim 3 and wherein said directing takes place from an ultrasonic transducer located outside of the body.

18. A method according to claim 1 and wherein said ultrasonic energy has a frequency in a range of 50 KHz - 1000 KHz.

19. A method according to claim 1 and wherein said ultrasonic energy has a frequency in a range of 100 KHz - 500 KHz.

20. A method according to claim 1 and wherein said ultrasonic energy has a frequency in a range of 150 KHz - 300 KHz.

21. A method according to claim 1 and wherein said modulating provides a duty cycle between 1:2 and 1:250.

22. A method according to claim 1 and wherein said modulating provides a duty cycle between 1:5 and 1:30.

23. A method according to claim 1 and wherein said modulating provides a duty cycle between 1:10 and 1:20.

24. A method according to claim 20 and wherein said modulating provides a duty cycle between 1:10 and 1:20.

25. A method according to claim 1 and wherein said modulating provides between 2 and 1000 sequential cycles at an amplitude above a cavitation threshold.

26. A method according to claim 1 and wherein said modulating provides between 25 and 500 sequential cycles at an amplitude above a cavitation threshold.

27. A method according to claim 1 and wherein said modulating provides

between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

28. A method according to claim 20 and wherein said modulating provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

29. A method according to claim 24 and wherein said modulating provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

30. A method according to claim 1 and wherein said modulating comprises modulating the amplitude of said ultrasonic energy over time.

31. A method according to claim 3 and wherein said ultrasonic energy has a frequency in a range of 50 KHz - 1000 KHz.

32. A method according to claim 3 and wherein said ultrasonic energy has a frequency in a range of 100 KHz - 500 KHz.

33. A method according to claim 3 and wherein said ultrasonic energy has a frequency in a range of 150 KHz - 300 KHz.

34. A method according to claim 3 and wherein said modulating provides a duty cycle between 1:2 and 1:250.

35. A method according to claim 3 and wherein said modulating provides a duty cycle between 1:5 and 1:30.

36. A method according to claim 3 and wherein said modulating provides a duty cycle between 1:10 and 1:20.

37. A method according to claim 33 and wherein said modulating provides a duty cycle between 1:10 and 1:20.

38. A method according to claim 3 and wherein said modulating provides between 2 and 1000 sequential cycles at an amplitude above a cavitation threshold.

39. A method according to claim 3 and wherein said modulating provides between 25 and 500 sequential cycles at an amplitude above a cavitation threshold.

40. A method according to claim 3 and wherein said modulating provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

41. A method according to claim 33 and wherein said modulating provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

42. A method according to claim 37 and wherein said modulating provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

43. A method according to claim 3 and wherein said modulating comprises modulating the amplitude of said ultrasonic energy over time.

44. A method for lysing adipose tissue comprising the steps of:

generating, at a source outside a body, ultrasonic energy which selectively generally lyses adipose tissue and generally does not lyse non-adipose tissue; and

directing said ultrasonic energy, from said source outside said body, at a target volume of a body containing adipose tissue.

45. A method for lysing adipose tissue according to claim 44 and wherein said directing ultrasonic energy generally prevents lysis of tissue outside of said target volume.

46. A method for lysing adipose tissue according to claim 44 and also comprising:

ultrasonic imaging of said region at least partially concurrently with

directing said ultrasonic energy at said target volume.

47. A method for lysing adipose tissue according to claim 44 and wherein said directing comprises positioning at least one ultrasonic transducer relative to said body in order to direct said ultrasonic energy at said target volume.

48. A method for lysing adipose tissue according to claim 44 and wherein said directing comprises varying the focus of at least one ultrasonic transducer in order to direct said focussed ultrasonic energy at said target volume.

49. A method for lysing adipose tissue according to claim 48 and wherein varying the focus changes the volume of said target volume.

50. A method for lysing adipose tissue according to claim 48 and wherein varying the focus changes the distance of said target volume from said at least one ultrasonic transducer.

51. A method for lysing adipose tissue according to claim 46 and wherein said directing comprises positioning at least one ultrasonic transducer relative to said body in order to direct said ultrasonic energy at said target volume.

52. A method for lysing adipose tissue according to claim 46 and wherein said directing comprises varying the focus of at least one ultrasonic transducer in order to direct said focussed ultrasonic energy at said target volume.

53. A method for lysing adipose tissue according to claim 50 and wherein varying the focus changes the volume of said target volume.

54. A method for lysing adipose tissue according to claim 50 and wherein varying the focus changes the distance of said target volume from said at least one ultrasonic transducer.

55. A method for lysing adipose tissue according to claim 44 and also comprising sensing ultrasonic energy coupling to an external surface of said body adjacent said target volume.

56. A method for lysing adipose tissue according to claim 44 and also comprising sensing of cavitation at said target volume.

57. A method for lysing adipose tissue according to claim 46 and also comprising sensing ultrasonic energy coupling to an external surface of said body adjacent said target volume.

58. A method for lysing adipose tissue according to claim 46 and also comprising sensing of cavitation at said target volume.

59. A method according to claim 44 and wherein said ultrasonic energy has a frequency in a range of 50 KHz - 1000 KHz.

60. A method according to claim 44 and wherein said ultrasonic energy has a frequency in a range of 100 KHz - 500 KHz.

61. A method according to claim 44 and wherein said ultrasonic energy has a frequency in a range of 150 KHz - 300 KHz.

62. A method according to claim 44 and wherein said modulating provides a duty cycle between 1:2 and 1:250.

63. A method according to claim 44 and wherein said modulating provides a duty cycle between 1:5 and 1:30.

64. A method according to claim 44 and wherein said modulating provides a duty cycle between 1:10 and 1:20.

65. A method according to claim 60 and wherein said modulating provides a duty cycle between 1:10 and 1:20.

66. A method according to claim 44 and wherein said modulating provides between 2 and 1000 sequential cycles at an amplitude above a cavitation threshold.

67. A method according to claim 44 and wherein said modulating provides between 25 and 500 sequential cycles at an amplitude above a cavitation threshold.

68. A method according to claim 44 and wherein said modulating provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

69. A method according to claim 60 and wherein said modulating provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

70. A method according to claim 67 and wherein said modulating provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

71. A method according to claim 44 and wherein said modulating comprises modulating the amplitude of said ultrasonic energy over time.

72. A method according to claim 46 and wherein said ultrasonic energy has a frequency in a range of 50 KHz - 1000 KHz.

73. A method according to claim 46 and wherein said ultrasonic energy has a frequency in a range of 100 KHz - 500 KHz.

74. A method according to claim 46 and wherein said ultrasonic energy has a frequency in a range of 150 KHz - 300 KHz.

75. A method according to claim 46 and wherein said modulating provides a duty cycle between 1:2 and 1:250.

76. A method according to claim 46 and wherein said modulating provides a duty cycle between 1:5 and 1:30.

77. A method according to claim 46 and wherein said modulating provides a duty cycle between 1:10 and 1:20.

78. A method according to claim 74 and wherein said modulating provides a duty cycle between 1:10 and 1:20.

79. A method according to claim 46 and wherein said modulating provides between 2 and 1000 sequential cycles at an amplitude above a cavitation threshold.

80. A method according to claim 46 and wherein said modulating provides between 25 and 500 sequential cycles at an amplitude above a cavitation threshold.

81. A method according to claim 46 and wherein said modulating provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

82. A method according to claim 74 and wherein said modulating provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

83. A method according to claim 81 and wherein said modulating provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

84. A method according to claim 46 and wherein said modulating comprises modulating the amplitude of said ultrasonic energy over time.

85. A method for lysing adipose tissue comprising the steps of:

defining a region in a body at least partially by detecting spatial indications on said body;

directing ultrasonic energy at a multiplicity of target volumes within said

region, which target volumes contain adipose tissue, thereby to selectively lyse said adipose tissue in said target volumes and generally not lyse non-adipose tissue in said target volumes.

86. A method for lysing adipose tissue according to claim 85 and wherein said directing includes directing focussed ultrasonic energy at a multiplicity of target volumes in a time sequence.

87. A method for lysing adipose tissue according to claim 85 and wherein said directing includes directing focussed ultrasonic energy at plural ones of said multiplicity of target volumes at times which at least partially overlap.

88. A method for lysing adipose tissue according to claim 85 and wherein at least some of said multiplicity of target volumes at least partially overlap in space.

89. A method for lysing adipose tissue according to claim 85 and also comprising defining said region by marking at least one surface of said body.

90. A method for lysing adipose tissue according to claim 89 and also comprising defining said region by selecting at least one depth in said body.

91. A method for lysing adipose tissue according to claim 89 and also comprising defining said region by detecting adipose tissue in said body.

92. A method for lysing adipose tissue according to claim 91 and also comprising defining said region by detecting non-lysed adipose tissue.

93. A method for lysing adipose tissue according to claim 92 and wherein said directing also comprises defining said target volumes as unit volumes of non-lysed adipose tissue within said region.

94. A method for lysing adipose tissue according to claim 93 and wherein

said modulating said ultrasonic energy so as to selectively lyse said adipose tissue in said multiplicity of target volumes proceeds sequentially in time wherein selective lysis of adipose tissue in each target volume takes place only following detection of non-lysed adipose tissue therein.

95. A method for lysing adipose tissue according to claim 91 and wherein said directing also comprises defining said target volumes as unit volumes of adipose tissue within said region.

96. A method for lysing adipose tissue according to claim 95 and wherein said modulating said ultrasonic energy so as to selectively lyse said adipose tissue in said multiplicity of target volumes proceeds sequentially in time wherein selective lysis of adipose tissue in each target volume takes place only following detection of adipose tissue therein.

97. A method for lysing adipose tissue according to claim 85 and also comprising computerized tracking of said multiplicity of target volumes notwithstanding movement of said body.

98. A method for lysing adipose tissue according to claim 97 and wherein said computerized tracking includes sensing changes in the position of markings on said body and employing sensed changes for tracking the positions of said target volumes in said body.

99. A method for lysing adipose tissue comprising the steps of:

directing ultrasonic energy at a multiplicity of target volumes within said region, which target volumes contain adipose tissue, thereby to selectively lyse said adipose tissue in said target volumes and generally not lyse non-adipose tissue in said target volumes; and

computerized tracking of said multiplicity of target volumes notwithstanding movement of said body.

100. A method for lysing adipose tissue according to claim 99 and wherein said computerized tracking includes sensing changes in the position of markings on said body and employing sensed changes for tracking the positions of said target volumes in said body.

101. Apparatus for lysing adipose tissue comprising:

a focussed ultrasonic energy director, directing focussed ultrasonic energy at a target volume in a region of a body containing adipose tissue; and

a modulator, cooperating with said energy director to produce a focussed ultrasonic energy so as to selectively lyse said adipose tissue in said target volume and generally not lyse non-adipose tissue in said target volume.

102. Apparatus for lysing adipose tissue according to claim 101 and wherein said director generally prevents lysis of tissue outside of said target volume.

103. Apparatus for lysing adipose tissue according to claim 101 and also comprising:

an ultrasonic imager providing ultrasonic imaging of said region at least partially concurrently with directing said focussed ultrasonic energy at said target volume.

104. Apparatus for lysing adipose tissue according to claim 101 and wherein said director comprises a positioner, positioning at least one ultrasonic transducer relative to said body in order to direct said focussed ultrasonic energy at said target volume.

105. Apparatus for lysing adipose tissue according to claim 101 and wherein said director varies the focus of at least one ultrasonic transducer in order to direct said focussed ultrasonic energy at said target volume.

106. Apparatus for lysing adipose tissue according to claim 105 and wherein varying the focus changes the volume of said target volume.

107. Apparatus for lysing adipose tissue according to claim 105 and wherein varying the focus changes the distance of said target volume from said at least one ultrasonic transducer.

108. Apparatus for lysing adipose tissue according to claim 103 and wherein said director positions at least one ultrasonic transducer relative to said body in order to direct said focussed ultrasonic energy at said target volume.

109. Apparatus for lysing adipose tissue according to claim 103 and wherein said director varies the focus of at least one ultrasonic transducer in order to direct said focussed ultrasonic energy at said target volume.

110. Apparatus for lysing adipose tissue according to claim 109 and wherein varying the focus changes the volume of said target volume.

111. Apparatus for lysing adipose tissue according to claim 109 and wherein varying the focus changes the distance of said target volume from said at least one ultrasonic transducer.

112. Apparatus for lysing adipose tissue according to claim 101 and also comprising a sensor, sensing ultrasonic energy coupling to an external surface of said body adjacent said target volume.

113. Apparatus for lysing adipose tissue according to claim 101 and also comprising a sensor, sensing of cavitation at said target volume.

114. Apparatus for lysing adipose tissue according to claim 103 and also comprising a sensor, sensing ultrasonic energy coupling to an external surface of said body adjacent said target volume.

115. Apparatus for lysing adipose tissue according to claim 103 and also

comprising a sensor, sensing of cavitation at said target volume.

116. Apparatus according to claim 101 and wherein said director comprises an ultrasonic transducer located outside of the body.

117. Apparatus according to claim 103 and wherein said director comprises an ultrasonic transducer located outside of the body.

118. Apparatus according to claim 101 and wherein said ultrasonic energy has a frequency in a range of 50 KHz - 1000 KHz.

119. Apparatus according to claim 101 and wherein said ultrasonic energy has a frequency in a range of 100 KHz - 500 KHz.

120. Apparatus according to claim 101 and wherein said ultrasonic energy has a frequency in a range of 150 KHz - 300 KHz.

121. Apparatus according to claim 101 and wherein said modulator provides a duty cycle between 1:2 and 1:250.

122. Apparatus according to claim 101 and wherein said modulator provides a duty cycle between 1:5 and 1:30.

123. Apparatus according to claim 101 and wherein said modulator provides a duty cycle between 1:10 and 1:20.

124. Apparatus according to claim 20 and wherein said modulator provides a duty cycle between 1:10 and 1:20.

125. Apparatus according to claim 101 and wherein said modulator provides between 2 and 1000 sequential cycles at an amplitude above a cavitation threshold.

126. Apparatus according to claim 101 and wherein said modulator provides between 25 and 500 sequential cycles at an amplitude above a cavitation threshold.

127. Apparatus according to claim 101 and wherein said modulator provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

128. Apparatus according to claim 120 and wherein said modulator provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

129. Apparatus according to claim 124 and wherein said modulator provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

130. Apparatus according to claim 101 and wherein said modulator modulates the amplitude of said ultrasonic energy over time.

131. Apparatus according to claim 103 and wherein said ultrasonic energy has a frequency in a range of 50 KHz - 1000 KHz.

132. Apparatus according to claim 103 and wherein said ultrasonic energy has a frequency in a range of 100 KHz - 500 KHz.

133. Apparatus according to claim 103 and wherein said ultrasonic energy has a frequency in a range of 150 KHz - 300 KHz.

134. Apparatus according to claim 103 and wherein said modulator provides a duty cycle between 1:2 and 1:250.

135. Apparatus according to claim 103 and wherein said modulator provides a duty cycle between 1:5 and 1:30.

136. Apparatus according to claim 103 and wherein said modulator provides a duty cycle between 1:10 and 1:20.

137. Apparatus according to claim 133 and wherein said modulator provides a duty cycle between 1:10 and 1:20.

138. Apparatus according to claim 103 and wherein said modulator provides between 2 and 1000 sequential cycles at an amplitude above a cavitation threshold.

139. Apparatus according to claim 103 and wherein said modulator provides between 25 and 500 sequential cycles at an amplitude above a cavitation threshold.

140. Apparatus according to claim 103 and wherein said modulator provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

141. Apparatus according to claim 133 and wherein said modulator provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

142. Apparatus according to claim 137 and wherein said modulator provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

143. Apparatus according to claim 103 and wherein said modulator modulates the amplitude of said ultrasonic energy over time.

144. Apparatus for lysing adipose tissue comprising:

a source outside a body generating ultrasonic energy;

an ultrasonic energy director, which employs said ultrasonic energy to selectively generally lyse adipose tissue and generally not lyse non-adipose tissue in a target volume of a body containing adipose tissue.

145. Apparatus for lysing adipose tissue according to claim 144 and wherein said director generally prevents lysis of tissue outside of said target volume.

146. Apparatus for lysing adipose tissue according to claim 144 and also

comprising:

an ultrasonic imager, providing ultrasonic imaging of said region at least partially concurrently with directing said ultrasonic energy at said target volume.

147. Apparatus for lysing adipose tissue according to claim 144 and wherein said director comprises positioning at least one ultrasonic transducer relative to said body in order to direct said ultrasonic energy at said target volume.

148. Apparatus for lysing adipose tissue according to claim 144 and wherein said director varies the focus of at least one ultrasonic transducer in order to direct said ultrasonic energy at said target volume.

149. Apparatus for lysing adipose tissue according to claim 148 and wherein varying the focus changes the volume of said target volume.

150. Apparatus for lysing adipose tissue according to claim 148 and wherein varying the focus changes the distance of said target volume from said at least one ultrasonic transducer.

151. Apparatus for lysing adipose tissue according to claim 146 and wherein said director positions at least one ultrasonic transducer relative to said body in order to direct said focussed ultrasonic energy at said target volume.

152. Apparatus for lysing adipose tissue according to claim 146 and wherein said director comprises varying the focus of at least one ultrasonic transducer in order to direct said focussed ultrasonic energy at said target volume.

153. Apparatus for lysing adipose tissue according to claim 150 and wherein varying the focus changes the volume of said target volume.

154. Apparatus for lysing adipose tissue according to claim 150 and wherein varying the focus changes the distance of said target volume from said at least one

ultrasonic transducer.

155. Apparatus for lysing adipose tissue according to claim 144 and also comprising a sensor, sensing ultrasonic energy coupling to an external surface of said body adjacent said target volume.

156. Apparatus for lysing adipose tissue according to claim 144 and also comprising a sensor, sensing of cavitation at said target volume.

157. Apparatus for lysing adipose tissue according to claim 146 and also comprising a sensor, sensing ultrasonic energy coupling to an external surface of said body adjacent said target volume.

158. Apparatus for lysing adipose tissue according to claim 146 and also comprising a sensor, sensing of cavitation at said target volume.

159. Apparatus according to claim 144 and wherein said ultrasonic energy has a frequency in a range of 50 KHz - 1000 KHz.

160. Apparatus according to claim 144 and wherein said ultrasonic energy has a frequency in a range of 100 KHz - 500 KHz.

161. Apparatus according to claim 144 and wherein said ultrasonic energy has a frequency in a range of 150 KHz - 300 KHz.

162. Apparatus according to claim 144 and wherein said modulator provides a duty cycle between 1:2 and 1:250.

163. Apparatus according to claim 144 and wherein said modulator provides a duty cycle between 1:5 and 1:30.

164. Apparatus according to claim 144 and wherein said modulator provides a

duty cycle between 1:10 and 1:20.

165. Apparatus according to claim 161 and wherein said modulator provides a duty cycle between 1:10 and 1:20.

166. Apparatus according to claim 144 and wherein said modulator provides between 2 and 1000 sequential cycles at an amplitude above a cavitation threshold.

167. Apparatus according to claim 144 and wherein said modulator provides between 25 and 500 sequential cycles at an amplitude above a cavitation threshold.

168. Apparatus according to claim 144 and wherein said modulator provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

169. Apparatus according to claim 161 and wherein said modulator provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

170. Apparatus according to claim 165 and wherein said modulator provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

171. Apparatus according to claim 144 and wherein said modulator comprises modulator the amplitude of said ultrasonic energy over time.

172. Apparatus according to claim 146 and wherein said ultrasonic energy has a frequency in a range of 50 KHz - 1000 KHz.

173. Apparatus according to claim 146 and wherein said ultrasonic energy has a frequency in a range of 100 KHz - 500 KHz.

174. Apparatus according to claim 146 and wherein said ultrasonic energy has a frequency in a range of 150 KHz - 300 KHz.

175. Apparatus according to claim 146 and wherein said modulator provides a duty cycle between 1:2 and 1:250.

176. Apparatus according to claim 146 and wherein said modulator provides a duty cycle between 1:5 and 1:30.

177. Apparatus according to claim 146 and wherein said modulator provides a duty cycle between 1:10 and 1:20.

178. Apparatus according to claim 174 and wherein said modulator provides a duty cycle between 1:10 and 1:20.

179. Apparatus according to claim 146 and wherein said modulator provides between 2 and 1000 sequential cycles at an amplitude above a cavitation threshold.

180. Apparatus according to claim 146 and wherein said modulator provides between 25 and 500 sequential cycles at an amplitude above a cavitation threshold.

181. Apparatus according to claim 146 and wherein said modulator provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

182. Apparatus according to claim 174 and wherein said modulator provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

183. Apparatus according to claim 178 and wherein said modulator provides between 100 and 300 sequential cycles at an amplitude above a cavitation threshold.

184. Apparatus according to claim 146 and wherein said modulator comprises modulator the amplitude of said ultrasonic energy over time.

185. Apparatus for lysing adipose tissue comprising the steps of:
a region definer, defining a region in a body at least partially by detecting

spatial indications on said body; and

a director, directing ultrasonic energy at a multiplicity of target volumes within said region, which target volumes contain adipose tissue thereby to selectively lyse said adipose tissue in said target volumes and generally not lyse non-adipose tissue in said target volumes.

186. Apparatus for lysing adipose tissue according to claim 185 and wherein said director directs focussed ultrasonic energy at said multiplicity of target volumes in a time sequence.

187. Apparatus for lysing adipose tissue according to claim 185 and wherein said director directs focussed ultrasonic energy at plural ones of said multiplicity of target volumes at times which at least partially overlap.

188. Apparatus for lysing adipose tissue according to claim 185 and wherein at least some of said multiplicity of target volumes at least partially overlap in space.

189. Apparatus for lysing adipose tissue according to claim 185 and wherein said definer employs marking at least one surface of said body.

190. Apparatus for lysing adipose tissue according to claim 189 and wherein said definer also employs selection of at least one depth in said body.

191. Apparatus for lysing adipose tissue according to claim 189 and wherein said definer detects adipose tissue in said body.

192. Apparatus for lysing adipose tissue according to claim 191 and wherein said definer defines said region at least partially by detecting non-lysed adipose tissue.

193. Apparatus for lysing adipose tissue according to claim 192 and wherein said director also defines said target volumes as unit volumes of non-lysed adipose

tissue within said region.

194. Apparatus for lysing adipose tissue according to claim 193 and wherein said director proceeds sequentially in time wherein selective lysis of adipose tissue in each target volume takes place only following detection of non-lysed adipose tissue therein.

195. Apparatus for lysing adipose tissue according to claim 191 and wherein said director also defines said target volumes as unit volumes of adipose tissue within said region.

196. Apparatus for lysing adipose tissue according to claim 195 and wherein said director proceeds sequentially in time wherein selective lysis of adipose tissue in each target volume takes place only following detection of adipose tissue therein.

197. Apparatus for lysing adipose tissue according to claim 185 and also comprising computerized tracking functionality providing computerized tracking of said multiplicity of target volumes notwithstanding movement of said body.

198. Apparatus for lysing adipose tissue according to claim 197 and wherein said computerized tracking functionality is operative to sense changes in the position of markings on said body and to employ sensed changes for tracking the positions of said target volumes in said body.

199. Apparatus for lysing adipose tissue comprising:

a director, directing ultrasonic energy at a multiplicity of target volumes within said region, which target volumes contain adipose tissue, thereby to selectively lyse said adipose tissue in said target volumes and generally not lyse non-adipose tissue in said target volumes; and

computerized tracking functionality providing computerized tracking of said multiplicity of target volumes notwithstanding movement of said body.

200. Apparatus for lysing adipose tissue according to claim 199 and wherein said computerized tracking functionality is operative to sense changes in the position of markings on said body and to employ sensed changes for tracking the positions of said target volumes in said body.